United States General Accounting Office

GAO

Report to the Committee on Finance, U.S. Senate and the Committee on Ways and Means, House of Representatives

January 2002

SSA DISABILITY

SGA Levels Appear to Affect the Work Behavior of Relatively Few Beneficiaries, but More Data Needed

Approved for Public Release
Distribution Unlimited

20020118 233



Contents

Letter				
	Results in Brief	2		
	Background	4		
	The SGA Level Appears to Affect the Work Effort of Relatively Few Beneficiaries	8		
	Effects Of SGA on Program Entry and Exit Rates Difficult to	Ü		
	Isolate	17		
	Conclusions	21		
	Recommendations for Executive Action	22 23		
	Agency Comments and Our Response	20		
Appendix I	Scope and Methodology	26		
	Our Sample	26		
	Analysis of the Effect of the SGA on Beneficiaries' Earnings	27		
	Analysis Of the Effect of the SGA on Program Entry and Exit	28		
	Limitations in Our Analysis	29		
Appendix II	Comments From the Social Security Administration	32		
Tables				
	Table 1: DI Beneficiaries with Earnings Between 75-100 Percent of the Annualized SGA Level	10		
	Table 2: Number and Average Annual Earnings of DI Beneficiaries	10		
	Who Worked	11		
	Table 3: Subsequent Earnings of Beneficiaries Who Had 1985			
	Earnings Exceeding the SGA Level, 1986-97	14		
	Table 4: Subsequent Earnings of Beneficiaries Who Had 1985			
	Earnings Between 75-100 Percent of the SGA, 1986-95	15		
	Table 5: Reasons for Exiting DI	21		
Figures				
	Figure 1: Distribution of DI Beneficiaries' Annual Earnings in 1985			
	and 1997	13		
	Figure 2: Entry and Exit Rates for the DI Program	18		

Abbreviations

AWI	average wage index
CWHS	Continuous Work History Sample
DI	Disability Insurance
SGA	Substantial Gainful Activity
SSA	Social Security Administration
SSI	Supplemental Security Income



United States General Accounting Office Washington, DC 20548

January 16, 2002

The Honorable Max Baucus Chairman The Honorable Charles E. Grassley Ranking Minority Member Committee on Finance United States Senate

The Honorable William M. Thomas Chairman The Honorable Charles B. Rangel Ranking Minority Member Committee on Ways and Means House of Representatives

The Social Security Administration's (SSA) Disability Insurance program is the primary federal income program for workers with disabilities, paying about \$50 billion in cash benefits to over 5 million disabled workers in 2000. Eligibility for Disability Insurance benefits is based on whether a person with a severe physical or mental impairment has earnings that exceed the Substantial Gainful Activity (SGA) level, which represents SSA's principal standard for determining whether a disabled individual is able to work. SSA terminates monthly cash benefit payments for beneficiaries who return to work (after completing a trial work period) and have earnings that exceed the SGA level, set at \$1,300 per month for blind beneficiaries and at \$780 per month for all other beneficiaries in 2002.

Some researchers and disability advocacy groups believe that the SGA level serves as a significant work disincentive for Disability Insurance beneficiaries, with many working beneficiaries "parking," or earning amounts that are close to, but never exceeding, the SGA level. According to this view, a large increase in, or elimination of, the SGA level would result in increased work by this population. However, others believe that while the SGA may serve as a work disincentive for some beneficiaries, this disincentive effect is likely to be small in comparison to the various other work limitations faced by beneficiaries. Rather than emphasizing the effect of the SGA on the work behavior of those already receiving Disability Insurance benefits, some of these observers point out that increasing or eliminating the SGA level could result in a significant increase in the number of disabled workers entering the Disability

Insurance program and a reduction in the number exiting the program, placing additional fiscal stress on the program.

The Ticket to Work and Work Incentives Improvement Act of 1999 requires that we assess the effects of changes in the SGA level on the Disability Insurance program. Specifically, we examined (1) the effects of the SGA on the work patterns of Disability Insurance beneficiaries and (2) the effects of the SGA on Disability Insurance program entry and exit rates. To assess these effects, we reviewed the economic and disability literature related to the effects of the SGA. We also analyzed SSA's Disability Insurance program data, including the Continuous Work History Sample (CWHS) over the period 1985 through 1997. In addition, we interviewed various SSA policy officials, academic experts, and representatives from disability advocacy groups. We performed our work in accordance with generally accepted government auditing standards from December 2000 to December 2001. (See app. I for a more detailed discussion of our scope and methodology.)

Results in Brief

Our work found that the SGA level affects the work patterns of only a small proportion of Disability Insurance beneficiaries. On average, about 32,000, or 7.4 percent, of those Disability Insurance beneficiaries who worked in any given year during the period 1985 through 1997 had earnings between 75 and 100 percent of the annualized SGA level. These beneficiaries comprised about 1 percent of all Disability Insurance beneficiaries. The proportion of Disability Insurance workers with earnings in this range of the SGA remained relatively small even as the total number of Disability Insurance beneficiaries who worked grew by almost 80 percent from 1985 to 1997. Even among those beneficiaries who have earnings near the SGA level in any given year, most experience a substantial decline in earnings over time. For example, almost half of those with earnings near the SGA level in 1985 had no earnings by 1989. However, our work also found evidence that the SGA may affect the earnings of some beneficiaries. About 13 percent of those beneficiaries with earnings near the SGA level in 1985 still had earnings near the SGA level in 1995, even though the level was increased during that period.

¹SSA collects annual, rather than monthly, earnings data. However, the SGA represents a monthly earnings limit. To permit comparison of the monthly limit to the annual data, we multiplied the monthly SGA amount by 12 to develop an annualized SGA. For example, the SGA level in 1995 was \$500 per month and the annualized SGA level was \$6,000 (\$500 X 12). See app. 1 for further details on our methodology.

However, the absence of key information identifying the monthly earnings of beneficiaries, their trial work period² status, and whether they are blind limit our ability to definitively identify a relationship between SGA levels and beneficiaries' work patterns.

Data limitations also make the effect of the SGA on Disability Insurance program entry and exit rates difficult to isolate. While the rate of program entry increased in the years immediately following a 1990 increase in the SGA level, it then gradually declined to a level below the pre-1990 entry rates. Although some researchers and policy makers believe that an increase in the SGA could encourage more people who are capable of working to enter the rolls, our analysis indicates that most new Disability Insurance beneficiaries were either not able or not inclined to increase their earnings or work at all. However, due to data limitations and the wide range of other possible factors affecting program entry-such as labor force responses to the 1990-91 recession and subsequent economic expansion—the link between the increase in the SGA level and these trends in entry is unclear. CWHS data indicate that, since 1990, Disability Insurance exit rates continue to be driven largely by beneficiary death and conversion to retirement benefits. However, the percentage of all exits caused by improvements in medical conditions or a return to work increased slowly, from 1.9 percent in 1985 to 9.2 percent in 1996, and then rose dramatically to 19.9 percent in 1997. While a substantial increase in the number of continuing disability reviews³ conducted by SSA may account, in part, for this 1997 upturn, data limitations preclude us from obtaining a full understanding of the link between the SGA and exit behavior.

²The trial work period allows a beneficiary to earn any amount for 9 months (which need not be consecutive) within a 60-month period and still receive full cash and medical benefits. At the end of the trial work period, if a beneficiary's earnings exceed the SGA level, cash benefits continue for an additional 3-month grace period and then stop. For 36 months after the trial work period ends, referred to as the extended period of eligibility, cash benefits will be reinstated for any month in which the person does not have countable earnings above the SGA level.

³SSA periodically conducts continuing disability reviews to verify that an individual on the rolls still has a disability that prevents that person from engaging in substantial gainful activity. Continuing disability reviews may be conducted when (1) substantial earnings are posted to a beneficiary's employment record, (2) a report of medical improvement is received from a vocational rehabilitation agency, (3) the beneficiary provides a voluntary report indicating medical improvement or return to work, or (4) a medical reexamination is scheduled based on an expectation that a beneficiary's impairment will improve.

This report contains a recommendation to the Commissioner of SSA concerning the types of data SSA needs to collect in order to assess the effects of the SGA on Disability Insurance program beneficiaries. In its written comments, SSA agreed that it needed to improve its collection of data on Disability Insurance program beneficiaries' earnings and employment and also provided a number of technical comments.

Background

From its origin in 1956, the Disability Insurance (DI) program has provided compensation for the reduced earnings of individuals who, having worked long enough and recently enough to become insured,⁴ have lost their ability to work due to a severe, long-term disability. The program is administered by SSA and is funded through payroll deductions paid into a trust fund by employers and workers. In addition to cash assistance, DI beneficiaries receive Medicare coverage after they have received cash benefits for 24 months. In 2000, about 5 million disabled workers received DI cash benefits totaling about \$50 billion, with average monthly cash benefits amounting to \$787 per person.⁵

To qualify for benefits, an individual must have a medically determinable physical or mental impairment that (1) has lasted or is expected to last at least 1 year or result in death and (2) prevents an individual from engaging in substantial gainful activity. Individuals are considered to be engaged in substantial gainful activity if they have countable earnings at or above a certain dollar level. In addition to determining initial eligibility, the SGA standard also applies to the determination of continuing eligibility for benefits. Beyond a 9-month trial work period and an additional 3-month grace period during which beneficiaries are allowed to have any level of earnings without losing benefits, benefit payments are terminated once SSA determines that a beneficiary's countable earnings exceed the SGA

⁴To be eligible for disability benefits, workers must be fully insured and, except for those who are disabled due to blindness, must also meet a test of substantial recent covered work. Under this test, workers aged 31 and older must have credit for work in covered employment for at least 20 quarters of the 40 calendar quarters ending with the quarter the disability began. Workers disabled before age 31 may qualify for benefits under a special insured status requirement.

⁵In the same year, the DI program also paid about \$5 billion in cash benefits to about 1.6 million spouses and children of disabled workers.

⁶To calculate countable earnings, SSA deducts from gross earnings the cost of items that, because of the impairment, a person needs to work (for example, attendant care services performed in a work setting, wheelchairs, or Braille devices).

level. DI benefits are also terminated when a beneficiary (1) dies, (2) reaches age 65, upon which DI benefits are automatically converted to Social Security retirement benefits, or (3) medically improves, as determined by SSA through periodic continuing disability reviews.

Under the Social Security Act, the Commissioner of Social Security has the authority to set the SGA level for individuals who have disabilities other than blindness. SSA has increased the SGA several times over the past decade, to \$500 per month in 1990 and to \$700 per month in July 1999. In December 2000, SSA finalized a rule calling for the annual indexing of the nonblind SGA level to the average wage index (AWI)⁷ and recently increased the level to \$780 on the basis of this indexing. The SGA level for individuals who are blind is set by statute and indexed to the AWI.⁸ Currently, the SGA for blind individuals is \$1,300 of countable earnings.⁹

Despite considerable disagreement and uncertainty among researchers, policy makers, and disability advocates over the employment effects of the SGA on DI beneficiaries, there is a theoretical basis for believing that the SGA acts as a work disincentive. That is, to maximize income, maintain health insurance coverage, or achieve a desirable labor-leisure tradeoff, beneficiaries may be inclined to limit their work effort to remain eligible for program benefits. This economic rationale is supported by anecdotal evidence from some beneficiaries who have reported that, although they would prefer to work or have greater earnings, they are fearful of doing so because of the severe financial consequences of exceeding the SGA—losing cash benefits and, eventually, Medicare benefits. In addition, some workers with disabilities whose current earnings are above the SGA level,

⁷The AWI is a measure of average wages of all employees in the United States.

⁸The Social Security Act did not initially distinguish between the SGA levels for blind and nonblind DI beneficiaries. This was changed in 1977 when the Social Security Financing Amendments (P.L. 95-216) set the SGA level for individuals who are blind equal to the monthly earnings limit set for Social Security retirees aged 65-69 (a dollar level higher than the SGA for nonblind beneficiaries). The Senior Citizens' Right to Work Act of 1996 (P.L. 104-121) removed the link between the retirement earnings limit and the SGA level for the blind. However, the act retained the higher SGA level for the blind that was in place at that time and allowed for continued annual indexing to the AWI.

⁹Blind and nonblind beneficiaries are also treated differently under several other DI provisions. For example, blind beneficiaries age 55 or older whose earnings exceed the SGA level are evaluated differently than nonblind beneficiaries. If the work performed requires a lower level of skill and ability than work done prior to age 55, benefits are suspended rather than terminated and will be reinstated in any month that earnings fall below SGA.

making them ineligible for the DI program, may reduce their earnings to become eligible for DI benefits.

Other researchers and policy makers believe that although the SGA level may serve as a work disincentive for some beneficiaries, this disincentive effect is likely to be very limited for several reasons. First, because severe long-term disability is a central criterion for DI eligibility, many DI beneficiaries may be unable to perform any substantial work. Even if they are willing and able to work, beneficiaries may face employment barriers, such as high costs for supportive services and equipment or discrimination. In addition, we reported previously that many beneficiaries are unaware of DI program provisions affecting work,10 and several researchers we spoke with said that some beneficiaries may not even know how much they are allowed to earn. In terms of the SGA's effect on those not currently on the DI rolls, disability advocates have stated that workers turn to the DI program only as a last resort and are not inclined to reduce income for the sole purpose of qualifying for benefits. Also, some studies indicate that the difficulty of qualifying for DI benefits-having to limit or cease work for at least 5 months before receiving benefits and undergoing a stringent review to certify one's condition as severely disabled-may itself be a factor discouraging workers with disabilities from applying for these benefits.11

Few empirical studies have examined the effects of the SGA on the work patterns of disabled beneficiaries and nonbeneficiaries. Two studies conducted in the late 1970s by SSA researchers found that the SGA level does not have a substantial effect on the work behavior of beneficiaries. These studies examined past increases in the SGA level to assess whether

¹⁰See Social Security Disability Insurance: Multiple Factors Affect Beneficiaries' Ability to Return to Work (GAO/HEHS-98-39, Jan. 1998) and SSA Disability: Program Redesign Necessary to Encourage Return to Work (GAO/HEHS-96-62, Apr. 1996).

¹¹Jonathan Gruber and Jeffrey D. Kubik, "Disability Insurance Rejection Rates and the Labor Supply of Older Workers," *Journal of Public Economics*, Vol. 64, Issue 1, 1997, pp. 1-23; Brent Krieder, "Social Security Disability Insurance: Applications, Awards, and Lifetime Income Flows," *Journal of Labor Economics*, Vol. 17, No. 4, Pt. 1, 1999, pp. 784-827.

¹²Paula A. Franklin, "Impact of the Substantial Gainful Activity Level on Disabled Beneficiary Work Patterns," Social Security Bulletin, Vol. 39, No. 8, 1976, pp. 20-29; Paula A. Franklin and John C. Hennessey, "Effect of the Substantial Gainful Activity Level on Disabled Beneficiary Work Patterns," Social Security Bulletin, Vol. 42, No. 3, 1979, pp. 3-17.

these increases led to greater labor force participation on the part of DI beneficiaries. Neither study identified any clear change in beneficiary earnings as the SGA level increased. However, a study conducted by the Office of Inspector General (OIG) at the Department of Health and Human Services (HHS) found that some beneficiaries who had completed a trial work period subsequently reduced their earnings below the SGA level so they could continue to receive DI benefits. ¹³ Out of the 100 cases sampled, 18 beneficiaries who were capable of working had quit work or reduced their earnings to maintain DI benefits. In addition, an internal study conducted by SSA researchers examined how the earnings patterns of DI beneficiaries age 55 or older changed after they converted to retirement benefits at age 65. ¹⁴ This study found that beneficiaries were more likely to return to work after converting to retirement benefits, which were subject to a more generous earnings limit. This evidence suggests that the SGA standard leads some beneficiaries to work less than they could.

Despite the difficulties inherent in comparisons of different programs, studies of earnings limits in other programs may also provide some insights on the effect of the SGA. For example, studies of the retirement earnings test¹⁵ indicate that this limit probably caused some retirees to restrain their earnings in order to avoid having their benefits reduced. However, this "parking" effect appeared to be limited to only a relatively small proportion of the retiree population. For example, one study found that only about 2 percent of insured workers aged 65-69 had earnings at or near the retirement earnings limit.¹⁶

¹⁸HHS/OIG, Audit of the Effectiveness of Title II Disability Work Incentives, A-13-92-00223 (Washington, D.C., 1993).

¹⁴John C. Hennessey and L. Scott Muller, "The Search for Evidence of Labor Supply Response to a Benefit Offset," unpublished manuscript, Nov. 1999.

¹⁵The retirement earnings test has undergone a number of changes over the years. For most of the 1980s, this test resulted in a \$1 reduction in Social Security benefits for every \$2 in earnings above an exempt amount for recipients aged 65-69. In the 1990s, the reduction in benefits was changed to \$1 for every \$3 in earnings above the exempt amount for beneficiaries aged 65-69. The exempt amount—which was automatically adjusted based on increases in the national average wage index—increased from \$6,600 a year in 1983 to \$15,500 in 1999. The Senior Citizen's Freedom to Work Act of 2000 (P.L. 106-182) eliminated the retirement earnings test for beneficiaries age 65 and older, effective for taxable years after December 31, 1999.

¹⁶Michael V. Leonesio, "Social Security and Older Workers," Social Security Bulletin, Vol. 56, No. 2, 1993, pp. 47-57. This study examined 1988 earnings data.

A study of the Supplemental Security Income (SSI)¹⁷ program's 1619(b) provision¹⁸ also indicates that an earnings limit can result in beneficiaries limiting their work effort.¹⁹ As the 1619(b) earnings threshold was increased, some SSI beneficiaries increased their earnings in line with this threshold, which is consistent with the idea that beneficiaries restrain earnings in order to maintain program (in this case, Medicaid) eligibility. However, this "parking" behavior was limited to only those beneficiaries who had significant earnings—a group comprising about 2 percent of all adult, disabled SSI beneficiaries.

The SGA Level Appears to Affect the Work Effort of Relatively Few Beneficiaries

Our analysis of SSA data indicates that the work patterns of most DI beneficiaries are unlikely to be affected by the SGA level. For example, from 1985 through 1997, on average, about 7.4 percent of DI beneficiaries who worked had annual earnings between 75 and 100 percent of the SGA level. These beneficiaries comprised only about 1 percent of the total DI caseload. This proportion of beneficiaries with earnings in this range of the SGA remained relatively small even though the number and proportion of DI beneficiaries who work rose dramatically during this period, increasing by almost 80 percent. Although almost one-fourth of working beneficiaries had earnings above the SGA level, most had very low earnings, well below the annualized SGA level. Even among those beneficiaries with earnings near the SGA level in a given year, most experience an eventual reduction in earnings in subsequent years.

Nevertheless, some beneficiaries may change their work effort in response to the SGA level. For example, we found that about 13 percent of working beneficiaries who had earnings between 75 and 100 percent of the

¹⁷SSI is a means-tested income assistance program for disabled, blind, or aged individuals who have low income and limited resources. Unlike the DI program, SSI has no prior work requirement. Eligible SSI applicants generally begin receiving cash benefits immediately upon entitlement and, in most cases, receipt of cash benefits makes them eligible for Medicaid benefits.

¹⁸Section 1619 of the Social Security Act allows SSI beneficiaries to keep Medicaid coverage even when earnings exceed the SGA level. SSI beneficiaries may keep their Medicaid coverage until earnings increase to a point – referred to as the threshold amount – that SSA considers high enough to replace the equivalent of SSI cash and Medicaid benefits.

¹⁹The Lewin Group, Inc., "Exploratory Study of Health Care Coverage and Employment of People with Disabilities: Final Report," prepared for the Department of Health and Human Services, Office of the Assistant Secretary for Planning and Evaluation, July 1998.

annualized SGA level in 1985 still had earnings near the SGA level in 1995, even though the SGA had increased from \$300 to \$500 a month during this period. In addition, about 7 percent of beneficiaries who did not have any earnings in the years immediately preceding their retirement earned income in the one or more years following retirement, when the SGA earnings limit no longer applied. However, while these findings are suggestive of a possible effect on work effort, our analysis could not definitively link beneficiary work patterns to the SGA level due in part to various limitations in SSA data, such as the lack of monthly earnings data.

About 1 Percent of All DI Beneficiaries Have Annual Earnings Near the SGA Level From 1985 through 1997, on average, about 7.4 percent of DI beneficiaries who worked –comprising about 1 percent of the total DI caseload – had annual earnings between 75 and 100 percent of the SGA level (see table 1). On an annual basis, the number of beneficiaries with incomes clustering at or just below the SGA level increased almost fourfold in absolute terms from 15,800 in 1985 to almost 60,000 in 1997. However, the annual percentage of working beneficiaries with earnings between 75 and 100 percent of the SGA level fluctuated from 8.5 percent in 1988 to 5.1 percent in 1990 to 8.9 percent in 1997.

²⁰There are no clear criteria for identifying the cutoff point at which a beneficiary can be said to be earning "near" the SGA level. Therefore, we examined beneficiaries' earnings at several increments between 75 and 95 percent of the SGA level. The increment reported here represents the broadest range (75 percent) that we examined. See app. II for more information on our methodology.

Table 1: DI Beneficiaries with Earnings Between 75-100 Percent of the Annualized SGA Level

Year	Number with earnings between 75-100 percent of the SGA	Percentage of working DI beneficiaries	Percentage of all DI beneficiaries
1985	15,800	7.2	0.6
1986	18,400	7.6	0.7
1987	19,200	7.5	0.7
1988	23,600	8.5	0.9
1989	23,000	7.4	0.8
1990	16,800	5.1	0.6
1991	23,500	6.5	0.8
1992	30,000	7.3	0.9
1993	35,500	7.1	1.0
1994	43,600	7.7	1.1
1995	45,900	7.5	1.1
1996	55,600	8.6	1.3
1997	59,800	8.9	1.4

Note: The annualized SGA level was \$3,600 from 1985-1989 and \$6,000 from 1990-1997. Sampling errors for the number of beneficiaries with earnings between 75-100 percent of the SGA from 1985 to 1993 do not exceed 17 percent of the value of those estimates.

Source: GAO analysis of CWHS data.

The proportion of beneficiaries with earnings at or just below the SGA level remained small even though the proportion of DI beneficiaries who worked rose dramatically, increasing by almost 80 percent between 1985 and 1997 (see table 2).²¹ The number of beneficiaries who worked increased from about 220,000 in 1985 to over 675,000 in 1997 and increased as a percent of all DI beneficiaries in every year, including during the 1990-91 recession.

²¹We considered a beneficiary to be working in a given year if SSA records for that individual indicated annual earnings greater than zero. See app. I for further information on SSA's earnings data and its limitations.

Table 2: Number and Average Annual Earnings of DI Beneficiaries Who Worked

Year	Number of Di beneficiaries who worked	Percentage of all DI beneficiaries	Mean earnings	Median earnings
1985	220,300	8.7	\$5,851	\$2,061
1986	241,100	9.3	5,753	2,022
1987	257,000	9.7	5,477	1,991
1988	278,100	10.3	5,338	2,061
1989	312,500	11.3	5,216	1,943
1990	331,600	11.4	5,529	2,019
1991	364,300	11.7	5,425	2,094
1992	410,600	12.1	4,990	1,968
1993	500,800	13.7	4,697	1,791
1994	567,600	14.6	4,862	1,968
1995	608,900	15.0	5,035	2,157
1996	645,100	15.3	5,213	2,314
1997	675,300	15.6	5,386	2,372

Note: Working is defined as having posted earnings greater than zero. Earnings are in constant 1997 dollars. The 95-percent confidence interval for the 1985 estimate of median earnings ranged from 1,812 to 2,246.

Source: GAO analysis of CWHS data.

Throughout the period, most working DI beneficiaries had very low earnings. For example, in 1995, the median annual earnings of working beneficiaries were about \$2,157²² and the majority of working beneficiaries—about 58 percent—earned no more than 50 percent of the annualized SGA level.²³ Although median earnings of working DI beneficiaries were about 15 percent higher in 1997 than they had been in 1985, they remained well below the annualized SGA level. While mean earnings for this group fluctuated between a high of \$5,851 in 1985 and a low of \$4,697 in 1993, figure 1 indicates that even with the 67 percent

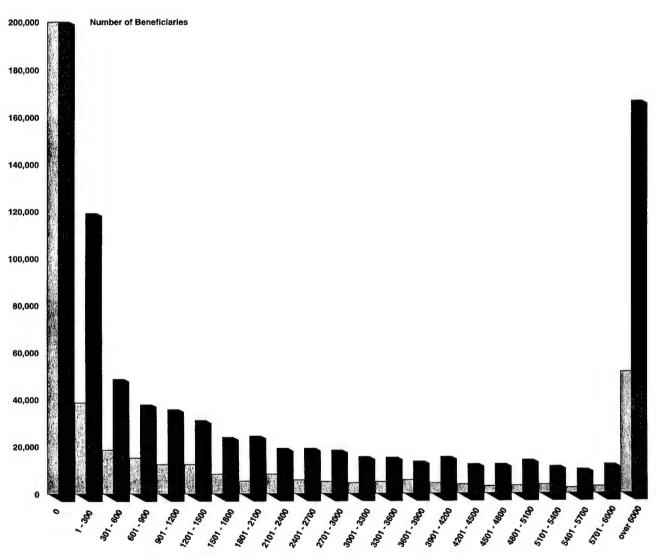
²²1997 dollars. Figures were adjusted based on the Bureau of Labor Statistics' Consumer Price Index for All Urban Consumers.

 $^{^{\}rm 23}{\rm About}\,23$ percent of beneficiaries who worked in 1995 had earnings above the annualized SGA level.

increase in the SGA level in 1990, the earnings distribution of DI beneficiaries did not change considerably from 1985 to 1997. $^{24}\,$

²⁴We found that, from 1990 to 1997, only 1 to 2 percent of beneficiaries who had earnings less than the SGA level prior to 1990 had increased their earnings to an amount between 75 and 100 percent of the new SGA level. For beneficiaries who had no earnings prior to 1990, less than half of 1 percent had earnings between 75 and 100 percent of the SGA level from 1990 to 1997.

Figure 1: Distribution of DI Beneficiaries' Annual Earnings in 1985 and 1997



Annual Earnings (Constant 1997 Dollars)



Note: For purposes of illustration, the bars indicating the number of beneficiaries are truncated at 200,000. The actual numbers estimated from the data for beneficiaries with no earnings are 2,306,400 in 1985 and 3,665,500 in 1997.

Source: GAO analysis of CWHS data.

We also examined beneficiaries who had earnings above the SGA level to see if, over time, they tended to reduce their earnings to an amount less than but close to the SGA level in order to maintain eligibility for DI benefits. We found that the majority of beneficiaries in 1985 who had earnings exceeding the SGA level eventually experienced a reduction to no earnings or to an amount less than 75 percent of the SGA (see table 3).

Table 3: Subsequent Earnings of Beneficiaries Who Had 1985 Earnings Exceeding the SGA Level, 1986-97

Percentage of 1985 cohort with:				
Year	Earnings above the SGA	Earnings between 75-100 percent of the SGA	Earnings between 1-74 percent of the SGA	No earnings
1986	55.8	7.4	14.2	22.6
1987	45.7	6.3	12.6	35.8
1988	40.0	4.7	11.6	43.7
1989	41.1	2.1	8.4	48.4
1990	31.6	5.8	17.4	45.3
1991	32.6	4.2	10.5	52.6
1992	32.1	1.6	10.0	56.3
1993	29.0	4.2	12.6	54.2
1994	29.5	1.1	13.2	56.3
1995	28.4	3.7	11.1	56.8
1996	30.0	1.1	14.2	54.7
1997	31.6	2.1	9.5	56.8

Note: For this analysis, we examined all 190 cases in the CWHS where DI beneficiaries had earnings above the SGA level in 1985 and remained on the rolls through 1997. We estimate that, in 1985, about 57,400 DI beneficiaries (comprising about 2 percent of all DI beneficiaries and about 26 percent of beneficiaries who worked) had earnings that exceeded the SGA level. We also estimate that about 19,000 of these beneficiaries remained on the DI rolls through 1997.

Source: GAO analysis of CWHS data.

By 1989, 48 percent of these individuals had no earnings and only 2 percent had earnings between 75 to 100 percent of the annualized SGA level. This indicates that most beneficiaries who at some point have earnings above the SGA level do not subsequently engage in "parking" to remain on the DI rolls. Nevertheless, the large shift that we observed from earnings above the SGA to no or very low earnings does suggest decreasing ability or motivation to work.

However, as late as 1997, about 32 percent of these beneficiaries had earnings exceeding the SGA level, indicating that some beneficiaries maintain their ability to achieve relatively substantial earnings. It is unclear why these individuals are able to consistently earn above the SGA

level while retaining eligibility for DI benefits. Although beneficiaries in a trial work period or an extended period of eligibility may have earnings that exceed the SGA level, these work incentive periods are time-limited. Only beneficiaries who are blind are permitted, on a continuing basis, to earn above the SGA level that applies to nonblind individuals. However, we could not determine the status of individuals who had earnings exceeding the SGA level because SSA's principal program data do not reliably identify whether a beneficiary is in a trial work period or extended period of eligibility and do not contain an indicator denoting whether a beneficiary is blind.

Most Beneficiaries with Earnings Near the SGA Level Do Not Maintain that Level of Earnings Among beneficiaries who have earnings at or near, but not exceeding, the SGA level in a given year, most experience a reduction in earnings in subsequent years. For example, of beneficiaries in 1985 who earned between 75 to 100 percent of the annualized SGA level, 47 percent had no earnings by 1989, while the earnings of another 26 percent had fallen to between 1 and 74 percent of the annualized SGA level (see table 4).

Table 4: Subsequent Earnings of Beneficiaries Who Had 1985 Earnings Between 75-100 Percent of the SGA, 1986-95

	Percentage of 1985 cohort with:				
Year	Earnings above the SGA	Earnings between 75-100 percent of the SGA	Earnings between 1-74 percent of the SGA	No earnings	
1986	15.7	27.1	34.3	22.9	
1987	12.9	14.3	35.7	37.1	
1988	20.0	12.9	25.7	41.4	
1989	15.7	11.4	25.7	47.1	
1990	4.3	8.6	40.0	47.1	
1991	2.9	11.4	34.3	51.4	
1992	4.3	8.6	32.9	54.3	
1993	5.7	10.0	31.4	52.9	
1994	5.7	7.1	32.9	54.3	
1995	2.9	12.9	31.4	52.9	

Note: For this analysis, we examined all 70 cases from the CWHS where DI beneficiaries had earnings between 75-100 percent of the SGA level in 1985 and remained on the rolls through 1995. We estimate that, in 1985, there were 15,800 DI beneficiaries (comprising less than 1 percent of all DI beneficiaries and about 7 percent of beneficiaries who worked) who had earnings between 75 to 100 percent of the annualized SGA level. We also estimate that about 7,000 of these beneficiaries remained on the DI rolls through 1995. Percentages in this table have sampling errors not exceeding 12.4 percentage points.

Source: GAO analysis of CWHS data.

Nevertheless, about 11 percent of these beneficiaries still had earnings in 1989 between 75 to 100 percent of the annualized SGA level, suggesting

that at least some beneficiaries may be attempting to stay close to the SGA without exceeding it. Even after the SGA level was increased in 1990, a small proportion of these beneficiaries continued to have earnings between 75 to 100 percent of the new annualized SGA level. For example, in 1995 about 13 percent of beneficiaries who had earnings between 75 to 100 percent of the annualized SGA level in 1985 still had earnings within this range of the higher annualized SGA level.

Small Number of Nonworking Beneficiaries Begin Employment After Initial Receipt of SSA Retirement Benefits

Our review of the earnings of former DI beneficiaries who were converted to retirement benefits at age 65 also indicates that the work patterns of only a small proportion of beneficiaries are affected by the SGA. For example, we looked at DI beneficiaries who converted to retirement benefits at age 65 between 1987 and 1993. Of those in this group who had no earnings in the 3 years preceding retirement, about 7 percent did have earnings in 1 or more years following retirement (between ages 66-68) when the SGA earnings limit no longer applied. While small, the proportion of beneficiaries returning to work after retirement is greater than the proportion of older beneficiaries who return to work while still on the DI rolls. For example, we found that of beneficiaries who had no earnings at ages 55-57, about 3 percent had earnings at ages 58-60. These data suggest that, at least for a limited number of beneficiaries, the SGA may serve as a disincentive to work.

Data Limitations Suggest Caution in Ascertaining SGA's Effects

For each analysis, the absence of key data elements made it difficult for us to determine the effects of the SGA level. For example, because SSA collects annual rather than monthly earnings data, we could not observe earnings relative to the SGA level on a monthly basis. However, many workers with disabilities may engage in only intermittent work throughout the year. The annual earnings data did not allow us to observe those individuals who only work several months out of the year and, in order to ensure receipt of benefits, "park" at the SGA level in those months.

Another data limitation is the difficulty in identifying whether a DI beneficiary is in a trial work period. Without reliable information on the

²⁵For this analysis, we examined beneficiaries who had entered the DI rolls prior to age 62, were converted to retirement benefits at age 65 between 1987 and 1993 (the years from which we identified our cohort for this analysis), and survived to age 68. These beneficiaries comprised, on average, about 9 percent of all DI beneficiaries. About 93 percent of these beneficiaries had no earnings in the 3 years preceding retirement.

trial work period status of beneficiaries, we could not determine the full range of work incentives and disincentives potentially affecting the earnings of DI beneficiaries. In addition, neither the CWHS nor SSA's principal administrative file for the DI program (the Master Beneficiary Record) contain data that identify whether a beneficiary is blind. Such a distinction is important to analyses relating to the SGA because blind beneficiaries are subject to a higher SGA limit than nonblind beneficiaries are. Distinguishing blind and nonblind beneficiaries may help explain why a substantial proportion of beneficiaries continue to earn above the nonblind SGA level while retaining DI eligibility.

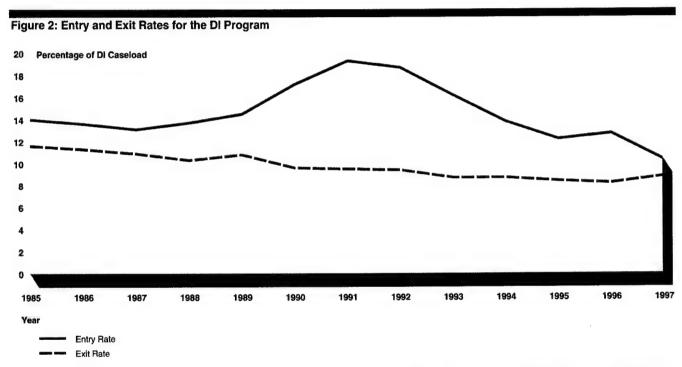
Effects Of SGA on Program Entry and Exit Rates Difficult to Isolate

Data and methodological limitations make it difficult to ascertain the effect of the SGA on DI program entry and exit rates.27 After 1990, the rate of program entry initially increased and then gradually declined. Although some researchers and policy makers believe that an increase in the SGA could encourage more people who are capable of working to enter the rolls, our analysis indicates that most new entrants were either not able or not inclined to increase their earnings or work at all. However, because of data limitations and the wide range of other possible factors affecting program entry, the link between the increase in the SGA level and these trends in entry is unclear. The analysis of program exits indicated that although the number of beneficiaries exiting the program rose over the 7 years after the 1990 increase in the SGA level, the annual rate of exit generally declined. While beneficiary deaths and conversions to retirement benefits accounted for most program exits, the percentage of exits caused by medical improvement or a return to work increased gradually, from 1.9 percent in 1985 to 9.2 percent in 1996, and then rose sharply to 19.9 percent in 1997. However, the aggregation of medical improvement and return-to-work data prevent us from obtaining a full understanding of the link between the SGA and DI program exit behavior.

²⁶SSA does maintain data identifying whether a beneficiary is blind in another data set—the 831 Disability File. The 831 file contains data from initial medical determinations for individuals applying for DI or SSI benefits. However, we obtained information from SSA indicating that the data fields in this file that identify blindness may not be reliable in about 20% of the cases.

²⁷The number of beneficiaries entering the DI program exceeded the number exiting the program in every year of our analysis. Therefore, the total number of DI beneficiaries increased from about 2.7 million to 4.5 million from 1985 to 1997. However, our discussion in this section deals separately with patterns of program entry and exit, rather than overall program growth.

Annual Program Entry Rates Varied from 1990 through 1997, but Limitations Prevent Assessment of Alternative Explanations Our analysis showed that the rate of program entry varied between 1990 and 1997, reaching a high of 19.3 percent in 1991 and then gradually declining, except for a slight upward movement in 1996, to a low of 10.3 percent in 1997 (see figure 2). In 1990, there was a discernible jump in the rate of program entry, which continued into 1991. The 1990 and 1991 rates were higher than the rates in any of the pre-1990 years we analyzed.



Note: The entry rate was calculated by dividing the number of new beneficiaries in a given year by the total number of DI beneficiaries on the rolls at the end of the previous year. The exit rate was calculated by dividing the number of exiting beneficiaries in a given year by the total number of DI beneficiaries on the rolls at the end of the previous year.

Source: GAO analysis of CWHS data.

The 1990 increase in the SGA level could have encouraged additional program entry to the extent that individuals with disabilities whose earnings were between the pre-1990 SGA level and the 1990 SGA level

could then qualify for benefits. ²⁸ Also, some individuals could have reduced their earnings in order to qualify for DI benefits and then increased their earnings once they became eligible. However, the data we examined indicate that most DI beneficiaries who entered the program between 1990 and 1995 were either not able or not inclined to increase their earnings or work at all after receiving benefits. Relatively few of these new DI beneficiaries—between 2 to 5 percent—increased their earnings above the SGA level within the first 3 years after their initial year in the program and most new beneficiaries had no earnings during these first several years on the rolls. ²⁹

There are a number of factors other than the increase in the SGA level that likely affected the post-1990 DI program entry rates. For example, given that entry rates began to increase in 1988, prior to the 1990 SGA increase, the growth in program entry in 1990 and 1991 may simply represent a continuation of this earlier trend. In our prior work, we described several program factors, such as changes in the criteria for evaluating mental impairment disabilities, that appear to have contributed to this trend.30 In addition, a general labor force response to the 1990-91 recession might also explain the increase in entry. The recession could have resulted in layoffs of individuals with disabilities, as well as other workers. In response, some of these individuals might have sought entry to the DI program, rather than continuing a job search, even though they were previously able to work and earn above the SGA level. From the data, we cannot differentiate the reason for entry by a beneficiary, and so have no way of determining whether the increase in entry was related to the increase in the SGA level or some other factor. Likewise, the ensuing economic expansion may have helped to ensure continuing work and significant earnings for some disabled workers, thereby reducing the number of workers seeking and receiving DI benefits. In addition, advances in medicine and medical care, along with advances in and increased use of assistive devices and equipment (for example, adapted

 $^{^{28}\}mathrm{In}$ assessing the effects of increasing the SGA from \$500 to \$700 in 1999, SSA estimated that by fiscal year 2004, an additional 27,000 individuals whose earnings exceeded the prior SGA level but were less than the new level would receive DI benefits as a result of this increase.

²⁹We tracked the earnings, through 1997, of beneficiaries who entered the DI rolls between 1990 and 1995. For the years we analyzed, the percentage of these new beneficiaries who had no subsequent earnings ranged from about 76 to 88 percent.

³⁰See Social Security: Disability Rolls Keep Growing, While Explanations Remain Elusive (GAO/HEHS-94-34, Feb. 1994).

computers/keyboards), may have allowed some disabled workers to remain gainfully employed.

Program Exits Since 1990 Driven by Retirement and Death but Data Are Limited

Our analysis of DI program exits indicated that the yearly rate of exit generally declined over the 1990 to 1997 period³¹ even though the number of beneficiaries exiting the program was increasing (see figure 2).

Program exit is largely driven by beneficiaries' death or their conversion to retirement benefits, which together account for about 95 percent of aggregate program exits between 1985 and 1997 (see table 5). While medical improvement or return to work gradually increased from 2 to 9 percent of all exits between 1985 and 1996, there was a dramatic increase in the percentage of DI beneficiaries exiting the program in 1997 for these reasons.

³¹However, this trend in exit rates began prior to 1990, and a variety of factors, such as a decline in the average age of new beneficiaries, may have contributed to it.

³²Our figures on the reasons for program exit, or termination, differ somewhat from those computed based on data reported by SSA (see Tim Zayatz, A.S.A., "Social Security Disability Insurance Program Worker Experience," Actuarial Study No. 114, July 1999). In particular, SSA data indicate somewhat higher exit rates due to reasons other than death and conversion to retirement benefits. These differences are likely attributable, in part, to the use of different sources of data on program exit. However, despite these differences, the trends portrayed in our data on exits are generally consistent with those indicated in the SSA data.

Table 5: Reasons for Exiting DI

Year	Conversion to retirement benefits	Death	Returned to work/medical improvement
1985	57.4%	40.7%	1.9%
1986	55.8	40.5	3.7
1987	55.4	39.4	5.2
1988	51.5	41.8	6.7
1989	56.0	39.8	4.2
1990	52.6	43.4	3.9
1991	53.1	43.8	3.1
1992	51.0	44.7	4.3
1993	50.4	44.5	5.1
1994	47.7	45.4	6.8
1995	48.3	42.9	8.8
1996	49.5	41.3	9.2
1997	44.6	35.5	19.9

Note: In cases where the data indicated that a person who had been eligible for DI benefits was no longer eligible, we looked to see whether a retirement or death indicator was recorded. In cases where neither of these indicators were shown, we inferred that the person had left the DI rolls due to either one of two other possible reasons; they were determined to have medically improved or they were engaged in substantial gainful activity upon returning to work.

Source: GAO analysis of the CWHS data.

It is unclear what effect, if any, the SGA may have had on these program exits because, although the data indicate whether the beneficiary reached retirement age or died, they do not indicate whether the beneficiary returned to work or whether a continuing disability review determined that they had medically improved. The large increase in the percentage of beneficiaries returning to work or medically improving for 1997 may be related, in part, to an increase in the number of continuing disability reviews that occurred during 1997. However, a strong economy that drew more DI beneficiaries into the labor force or other factors also may have played a role.

Conclusions

Our analysis of DI beneficiary earnings from the mid-1980s to the mid-1990s suggests that the SGA level may act as a work disincentive for only a small proportion of DI beneficiaries. This is generally consistent with

³³Congress authorized about \$4.1 billion dollars to fund a 7-year initiative by SSA to conduct about 8.2 million continuing disability reviews during fiscal years 1996 through 2002. In fiscal years 1996 and 1997, SSA conducted 1.2 million continuing disability reviews.

studies of the SGA and of earnings limits in related programs, which indicate that such limits, at most, affect a relatively small proportion of beneficiaries. However, the limitations in the available data mean that our findings should be accepted with caution. The lack of data on monthly earnings; on beneficiaries who are blind or are in a trial work period; and on beneficiaries who return to work, to name only a few areas, all hampered our efforts to arrive at more definitive conclusions. In particular, the lack of data identifying whether a beneficiary is blind precluded us from analyzing the effect of different SGA levels on blind and nonblind DI beneficiaries.

We place significance on our finding that the SGA's effect remained small even as increasing numbers of DI beneficiaries entered the labor force. While the DI program had grown by almost 72 percent from 1985 to 1997, the number of employed DI beneficiaries more than tripled. The number of working DI beneficiaries increased every year, even during the recession of the early 1990s. Yet it is unclear what has been driving this increase in employment. Given that most of these new workers have earnings far below the SGA level and remain at those low levels for many years afterwards, it is unlikely that this increase was caused by an increase in the SGA level. Other possible explanations include a buoyant economy throughout most of this period since 1985, enhanced employment protections for the disabled, increased availability of assistive technology, and a greater acceptance of hiring workers with disabilities by society in general. While this development has important implications for the DI program, the lack of data again makes it difficult for program officials, researchers, and policy makers to gain a better understanding of this phenomenon and reconfigure the DI program's return-to-work incentives to reinforce this trend.

Recommendations for Executive Action

The DI program, program beneficiaries, policy makers, and the general public could all greatly benefit from the collection of data that would facilitate a more comprehensive analysis of critical employment and program policy issues. Therefore, we recommend that the Commissioner of SSA take action to identify the full range of data necessary to assess the effects of the SGA on DI program beneficiaries, develop a strategy for reliably collecting these data, and implement this strategy in a timely manner, balancing the importance of collecting such data with considerations of cost, beneficiary privacy, and effects on program operations. In our study, we noted several key data elements that would be needed for a comprehensive assessment of the effects of the SGA level on program beneficiaries. These include data that identify the monthly

earnings of beneficiaries and whether a beneficiary is blind, is participating in a trial work period, or has exited the DI program based on a return to work. Some of these data, such as information identifying whether a beneficiary is blind or is participating in a trial work period, is already collected by SSA but is not reliably recorded and maintained in SSA's principal DI program data base. Other information, such as monthly earnings data, may be difficult to collect and involve data issues that extend beyond the DI program. There may also be additional information, beyond the data elements we discussed, that SSA may consider necessary for assessing the effects of the SGA.

Agency Comments and Our Response

In commenting on a draft of this report, SSA agreed with our recommendation. The agency, while acknowledging that it currently does not have the capability in place to track the employment and earnings patterns of DI beneficiaries, noted that it has made a commitment to collecting and analyzing DI beneficiary data. SSA stated that it is currently reaffirming that commitment and is developing a strategy to improve its efforts to collect such data. (SSA's comments appear in app. II.)

We believe that SSA's stated commitment to developing improved data on DI beneficiaries' earnings and employment represents a positive development. Such a commitment should include the development and implementation of a comprehensive strategy that would collect the data required for assessing the earnings and employment of all DI beneficiaries rather than just a subset, such as those who participate in particular programs initiated under the Ticket to Work Act. This strategy should also include additional data elements that would provide insight into our understanding of DI beneficiaries' employment, such as data identifying beneficiaries who are blind or who are participating in a trial work period.

SSA also provided some technical comments. The agency noted that although our report acknowledges various data limitations that affected our analysis, including limitations in SSA's earnings data, we did not sufficiently emphasize the extent to which these earnings data might include income that is not related to current employment. In addition, SSA stated that our data on reasons for exit, or termination, from the DI program varied from those published by SSA's Office of the Chief Actuary. Finally, SSA questioned our analysis of beneficiaries whose earnings consistently exceed the SGA level.

With regard to our discussion of limitations in the earnings data, we agree with SSA that these limitations are considerable and have noted that

throughout the report. In particular, SSA highlighted the potential for SSA earnings records to include income that may not be related to current work. It is unclear whether a substantial portion of the earnings data we analyzed was unrelated to current work. For example, an SSA study³⁴ stated that the agency's earnings data may include "certain payments from profit sharing plans." However, the study also noted that few beneficiaries had actually participated in such plans. In addition, although this study indicated a sizeable discrepancy between SSA earnings data and earnings reported by some beneficiaries in a survey interview, it was unclear whether this discrepancy was due to limitations in SSA data or to limitations inherent in self-reported data.

Regarding the differences between our data on the reasons for program exit, or termination, and the data reported by SSA, we acknowledge in the report that SSA data indicate somewhat higher exit rates due to reasons other than death and conversion to retirement benefits. We believe that these differences are likely attributable to the use of different sources of data on program exit. We used the CWHS because it was the most appropriate data set for conducting a longitudinal analysis of beneficiaries' earnings in relation to the SGA level. Further, although the termination rates we report do differ from SSA's data, the trends portrayed in our data on exits are, in fact, generally consistent with those indicated in the SSA data. For example, where SSA's data indicate a 10.5 percentage point increase in program exit due to medical recovery or return-to-work from 1996 to 1997 (from 12.3 percent to 22.9 percent), GAO's data similarly indicate a 10.7 percentage point increase (from 9.2 percent to 19.9 percent). Given that our discussion of program exits focuses primarily on trends rather than absolute numbers, we believe that our data adequately support our finding.

Finally, regarding the issue of some beneficiaries being able to consistently earn above the SGA level, we identified in the report several reasons why some beneficiaries might do so. For example, such beneficiaries may be blind and thus subject to a higher SGA level than nonblind beneficiaries. We also note that without better DI program data, including data identifying whether a beneficiary is blind or in a trial work period, we could not provide a more definitive explanation of this

³⁴L. Scott Muller, "Comparisons of Self-Reported Work Activity and Administrative Earnings Reports of Individuals Recently Entitled to Social Security Disability Insurance Benefits," unpublished manuscript, Apr. 1990.

phenomenon. Examination of individual case folders to determine why beneficiaries continued to earn above the SGA level—an approach suggested by SSA—was not a viable option for us on this study given our resources and timeframes for completing the study.

SSA also made a few other technical comments, which we incorporated where appropriate.

We are sending copies of this report to the Honorable Jo Anne B. Barnhart, Commissioner of Social Security; appropriate congressional committees; and other interested parties. We will make copies available to others on request. This report is also available on GAO's home page at http://www.gao.gov.

If you or your staff have any questions concerning this report, please call me at (202) 512-7215 or Charles A. Jeszeck at (202) 512-7036. Other individuals making key contributions to this report include Mark Trapani, Michael J. Collins, and Ann Horvath-Rose.

Barbara D. Bovbjerg

Director, Education, Workforce,

and Income Security

Appendix I: Scope and Methodology

To conduct our work, we analyzed data from the Social Security Administration's (SSA) Continuous Work History Sample (CWHS). The CWHS consists of records representing a longitudinal 1 percent sample of all active Social Security accounts. It is designed to provide data on earnings and employment for the purpose of studying the lifetime working patterns of individuals. The data, drawn from SSA administrative data sets, contain information on an individual's Disability Insurance (DI) eligibility, earnings,¹ and demographic characteristics. We did not independently verify the accuracy of the CWHS data because they were commonly used by researchers in the past and they are derived from a common source of DI program information.

Our Sample

From the total sample of 2,955,942 individuals, we selected a subsample of 92,662 individuals who were eligible for DI benefits at some point between 1984 and 1998. To obtain this sample, we excluded individuals whose Social Security record indicated a gap in DI entitlement, DI beneficiary status beginning before age 18 or continuing past age 64, a date of death before their DI beneficiary status, and those not identified as the primary beneficiary. We could not determine the exact date of eligibility because the CWHS only provides eligibility status as of December 31 of each year. Therefore, individuals were included in our analysis only as of their second year of DI eligibility to assure that the earnings we observed occurred only while an individual was in beneficiary status. In addition to our main sample, we selected another subsample of 9,990 DI beneficiaries who reached age 65 during the 1987 to 1993 time period for the purpose of analyzing DI beneficiaries who were converted to retirement benefits.

¹Reports of earnings must be filed annually with SSA by every employer who is required to withhold income tax from wages and/or who is liable for Federal Insurance Contributions Act taxes—which are used to finance the Old Age and Survivors Insurance and Medicare Hospital Insurance programs. While almost all jobs in the U.S. are covered by these reporting requirements, there are several excluded categories of workers, such as federal civilian employees hired before 1984 and certain state and local government employees who participate in alternative retirement systems. In addition, some earnings reported to SSA may actually represent income derived from work activity in a previous year, such as commissions or bonuses from prior work.

²The one exception to this "two-year rule" occurred in our analysis of new program entrants where we identified DI eligibility as the first year that such eligibility was indicated in the data set.

Sampling Errors

All samples are subject to sampling error, which is the extent to which the sample results differ from what would have been obtained if the whole universe had been observed. Measures of sampling error are defined by two elements—the width of the confidence interval around the estimate (sometimes called precision of the estimate) and the confidence level at which the interval is computed. The confidence interval refers to the fact that estimates actually encompass a range of possible values, not just a single point. This interval is often expressed as a point estimate, plus or minus some value (the precision level). For example, a point estimate of 75 percent plus or minus 5 percentage points means that the true population value is estimated to lie between 70 percent and 80 percent, at some specified level of confidence.

The confidence level of the estimate is a measure of the certainty that the true value lies within the range of the confidence interval. We calculated the sampling error for each statistical estimate in this report at the 95-percent confidence level. All percentage estimates from the sample have sampling errors (95 percent confidence intervals) of plus or minus 10 percentage points or less, unless otherwise noted. All numerical estimates other than percentages have sampling errors of 10 percent or less of the value of those numerical estimates, unless otherwise noted.

Analysis of the Effect of the SGA on Beneficiaries' Earnings

To analyze the effects of the SGA on the earnings of DI beneficiaries, we attempted to determine whether DI beneficiaries engage in "parking," that is, whether they limit their earnings to a level at or just below the SGA limit in order to maintain eligibility for benefits. If beneficiaries do indeed park, then we would expect to find a clustering of earnings just below the SGA level. The occurrence of such clustering would provide a fairly strong indication that beneficiaries are limiting their employment and earnings to stay in the DI program, thereby reducing program exit. In addition, to the extent that beneficiaries park or otherwise limit their earnings due to a work disincentive effect of the SGA, we would expect an increase in the SGA level to result in a corresponding increase in beneficiaries' earnings.

To determine if earnings clustered around the SGA level, we examined the distribution of earnings both before and after the 1990 increase in the SGA level to see what proportion of beneficiaries had annual earnings at or within 5 percent, 10 percent, and 25 percent of the annualized SGA level. We also tracked those beneficiaries who had earnings near the annualized SGA level in a given year to see if they maintained this level of earnings in subsequent years. In addition, we tracked those beneficiaries who were on the rolls and had no earnings or had earnings below the annualized SGA

level prior to 1990 to see if they increased their earnings and clustered around the new annualized SGA level. Finally, we examined beneficiaries who, in a given year, had earnings above the annualized SGA level to see if, over time, they tended to reduce their earnings to an amount near, but below, the SGA to maintain program eligibility.

To further analyze whether DI beneficiaries limit their earnings due to the SGA, we observed how these individuals behave once they are no longer subject to the SGA level. We did this by looking at the earnings of DI beneficiaries who reached age 65 and were converted to the Old Age and Survivors Insurance (OASI) program. Once DI beneficiaries reach age 65, they are converted to retired worker status and their benefits are paid from the OASI trust fund. Likewise, they are no longer subject to the SGA limit.3 If beneficiaries are limiting their earnings due to the SGA, then we would expect them to increase their earnings after retirement at age 65. Therefore, a finding that a significant proportion of former DI beneficiaries return to work or increase earnings after conversion would serve as some evidence for the work disincentive effect of the SGA. For DI beneficiaries who had entered the DI rolls prior to age 62, remained on the rolls until being converted to retirement benefits at age 65, and survived to age 68, we examined their earnings between ages 66 - 68 to determine whether there was an increase in earnings and employment after they left the DI program.

Analysis Of the Effect of the SGA on Program Entry and Exit

To examine the effects of the SGA on DI program entry and exit rates, we looked at the rate of entry and exit both before and after the increase in the SGA. If people respond to the change in the SGA then we might expect the rate of entry to increase after the increase in the SGA level. With the higher SGA level, some individuals with disabilities would now qualify for benefits if their earnings are between the old and new SGA level. Likewise, some individuals with earnings just above the new SGA level may reduce their earnings in order to qualify and then increase their

³Although they were, until January 2000, subject to the retirement earnings limit, which was much higher than the nonblind SGA level during our period of analysis.

⁴We calculated entry rates by dividing the number of new beneficiaries in a given year by the total number of DI beneficiaries on the rolls in the previous year. Similarly, we calculated exit rates by dividing the number of exiting beneficiaries in a given year by the total number of DI beneficiaries on the rolls in the previous year.

⁵Assuming they also meet other DI eligibility criteria.

earnings after they become eligible. Therefore, we examined the earnings, through 1997, of new beneficiaries who entered the DI program between 1990 and 1995 to see if they tended to increase their earnings after becoming eligible for benefits.

In terms of program exit, we might expect exit rates to decrease after an increase in the SGA level since many working beneficiaries may now be further from the new level and some may even increase their earnings to an amount near the new level (but higher than the old level) without having their benefits terminated. We examined data indicating the reasons that beneficiaries' exit DI to determine the extent to which program exits resulted from beneficiaries returning to work or medically improving versus retirements or deaths.

Limitations in Our Analysis

The absence of key data in the CWHS and in other SSA data sets limited our ability to draw clear conclusions from our analysis. For example, while the SGA is a monthly level, the available earnings data are recorded only on a yearly basis. Therefore, we were not able to analyze DI beneficiaries' monthly earnings in relation to the actual, monthly SGA limit. Instead, we examined beneficiary earnings in terms of the annualized SGA level; that is, we multiplied the monthly SGA amount by 12 to permit comparison of the monthly limit to the annual data. (For example, the SGA level in 1995 was \$500 per month, so the annualized SGA level was \$500 multiplied by 12, or \$6,000.) As a result, we were not able to identify parking that might have occurred among beneficiaries who, for example, worked for only a few months during the year but limited their earnings to a level near, but not exceeding, the SGA level in each of those months. Nevertheless, our analysis did allow us to identify individuals who consistently have earnings at or near the SGA level. To the extent that beneficiaries are trying to maximize their income-that is, earn as much as they can within a given year while maintaining DI eligibility—there may be a significant number of beneficiaries who have sustained earnings up to the SGA level through much of the year.

⁶It is also possible that some beneficiaries who worked only intermittently during the year had annual earnings at or near the annualized SGA level. However, while earnings at or near the SGA level may be suggestive of parking behavior, we could not identify whether a beneficiary with earnings in this range was truly parking or had limited earnings due to other reasons.

Another data limitation concerned beneficiaries who are in a trial work period. The trial work period allows beneficiaries to test their ability to work without penalty. Therefore, beneficiaries can earn any amount without being subject to the SGA limit. Neither the CWHS nor other SSA data sets provide a reliable means for identifying beneficiaries in a trial work period. As a result, in our parking analysis, we were not able to distinguish the earnings of beneficiaries who are subject to the SGA limit from those who are not subject to this limit. Although the trial work period allows beneficiaries to earn any amount, there is no reason to believe that all beneficiaries in a trial work period will have earnings greater than the SGA level. An individual's disability may limit his/her earnings to well below the SGA level. However, we do not believe that this limitation affected our analysis to a great extent because it is unlikely that the earnings of beneficiaries in a trial work period would systematically fall at or near the SGA level and thereby skew our analysis.

The identification of blind and nonblind beneficiaries also created a limitation in our analysis. The CWHS does not allow us to distinguish between blind and nonblind DI beneficiaries, which is important since blind beneficiaries are subject to a higher SGA limit. Some of the beneficiaries that we observe earning above the nonblind SGA limit may actually be blind individuals. In addition, if a substantial number of blind beneficiaries had earnings just below the nonblind SGA level, then our analysis could exaggerate the existence of parking. However, this limitation is not likely to have substantially impacted our analysis of parking among nonblind beneficiaries because blind individuals represent only about 2 percent of the DI caseload and therefore probably comprised a very small portion of our sample. Perhaps more importantly, the inability to identify blind beneficiaries means that we could not assess the extent to which they exhibit parking behavior. As a result, our analysis may be understating the extent of parking in the DI program.

Finally, the lack of data on impairment-related work expenses (IRWE) also limited our ability to analyze the effects of the SGA level on employment. SSA deducts the cost of certain impairment-related expenses needed for work from earnings when making SGA determinations. The inability to identify IRWE could exaggerate the effect of the SGA on earnings since some beneficiaries near or above the SGA level may not have been at this level once IRWE was subtracted from their earnings. However, the inability to determine IRWE is not likely to have significantly impacted our analysis because SSA officials told us that IRWE was applied in only a very limited number of cases during the years of our analysis

Despite these substantial limitations, the CWHS is the best available data set for identifying the basic program information needed to conduct our analysis within acceptable timeframes. The principal alternative data set within SSA—the Master Beneficiary Record—does not lend itself to easy analysis because it is designed to fulfill SSA's administrative objectives. In particular, we did not choose to use this data set because it would not have provided the longitudinal data that we needed unless it was linked with other SSA administrative files containing DI program information. Linking these complex files would have raised many uncertainties regarding the ultimate quality of the data and would have added substantial time and complexity to our analysis. In addition, non-SSA data sets, such as the Census Bureau's Current Population Survey, could not serve our needs because, among other limitations, we would not be able to adequately identify DI program participation for most of the years of our analysis.

In addition to data limitations, our analysis was also constrained by the lack of any quantitative evaluation of other possible factors affecting the earnings of DI beneficiaries and disabled workers. For example, our analysis does not control for other factors in the economy such as recessions, implementation of the Americans With Disabilities Act (ADA), advances in medicine and medical care, and advances in and increased use of assistive devices and equipment. A recession may increase entry into the DI program, but implementation of the ADA and improvements in medical care and assistive devices and equipment may either decrease entry or increase exit. The inability to control for these factors limited our ability to make clear inferences from the data regarding the effects of the SGA.

Appendix II: Comments From the Social Security Administration



Ms. Barbara D. Bovbjerg
Director, Education, Workforce, and
Income Security Issues
U.S. General Accounting Office
Washington, D.C. 20548

Dear Ms. Bovbjerg:

Thank you for the opportunity to review and comment on the draft report, "Social Security Administration Disability: Substantial Gainful Activity Levels Appear to Affect the Work Behavior of Relatively Few Beneficiaries, But More Data Needed" (GAO-02-224). Our comments on the report are enclosed. If you have any questions, please have your staff contact Trudy Williams at (410) 965-0380.

Sincerely,

James Barnhart

Enclosure

SOCIAL SECURITY ADMINISTRATION WASHINGTON D.C. 20254

COMMENTS OF THE SOCIAL SECURITY ADMINISTRATION (SSA) ON THE GENERAL ACCOUNTING OFFICE (GAO) DRAFT REPORT, "SSA DISABILITY: SUBSTANTIAL GAINFUL ACTIVITY LEVELS APPEAR TO AFFECT THE WORK BEHAVIOR OF RELATIVELY FEW BENEFICIARIES, BUT MORE DATA NEEDED" (GAO-02-224)

Recommendation

The Commissioner of the Social Security Administration (SSA) should take action to identify the full range of data necessary to assess the effects of substantial gainful activity (SGA) on disability program beneficiaries, develop a strategy for reliably collecting these data and implement the strategy in a timely manner, balancing the importance of collecting such data with considerations of costs, beneficiary privacy, and effects on program operations.

Comments

In December 2000, SSA published a final regulation that provided automatic yearly indexing of the SGA monthly amount. In the preamble of that rule, SSA stated that it would periodically review the level to determine if it continues to be a reasonable and --- meaningful--indicator. As part of that review, the Agency committed to collection and analysis of Disability Insurance (DI) beneficiaries earnings data, including wages that exceed the SGA level, the duration of employment above the SGA amount and the average earnings of individuals achieving SGA. We are reaffirming that commitment and are developing a strategy to improve the Agency's data collection of DI beneficiaries' earnings.

As part of that strategy and in response to the Ticket to Work and Work Incentives Improvement Act of 1999, we have developed software to track earnings on a monthly basis for individuals who will be participating in the Ticket program. This software provides the basis for more extensive tracking of work and earnings by disabled beneficiaries in the future.

In addition, we are working on other measures for improving our data collection in this area such as gaining access to the Office of Child Support Enforcement earnings data. While we have access to these data for the Supplemental Security Income program, we do not yet have access for the DI program.

Technical Comments

While GAO adequately discusses certain data limitations, such as the fact that the SGA test is a monthly test and only annual earnings are available, there are other limitations that do not receive adequate discussion. For instance, the fact that earnings posted to the SSA earnings record include amounts that are not related to current work (e.g., may include commissions, bonuses, sick pay and other payments) is relegated to a footnote in the appendix that does not fully discuss sources of earnings other than work. This issue

2

of work vs. earnings should be made more prominent. (Prior review suggests that as much as half of earnings showing up in early post-entitlement years may not be related to work.) Also, Impairment-Related Work Expenses (IRWE), Blind Work Expenses, Subsidies, and other factors that affect how SSA establishes SGA should be more prominently cited in the main text, rather than relegated to the appendix.

To conduct its work, GAO analyzed data from the Continuous Work History Sample (CWHS) and reported on terminations (recoveries) resulting from medical improvement or return to work. That data set does not contain adequate information to be used for that purpose, and the result could be misleading termination numbers. In fact, the numbers presented in the report vary considerably from those published by the Office of the Chief Actuary (OCACT) (source: Actuarial Study 114: Social Security Insurance Program Worker Experience, June 1999). The GAO reports recoveries increasing from 1.5 percent of terminations in 1985 to 9.2 percent in 1996 and jumping to 19.7 percent in 1997. The OCACT data indicate recoveries increasing from 6.6 percent of terminations in 1985 to 12.3 percent in 1996 and jumping to 22.8 percent in 1997. There is considerable difference in these numbers, and while recoveries increased as a portion of terminations, the rise is not as dramatic as suggested by GAO. In fact, recovery rates fell through the early to mid-1990s before increasing again in the late 1990s. Also, while GAO attributes the sharp increase in recoveries in 1997 to increased continuing disability reviews, OCACT cites the drug addiction and alcohol legislative change as the cause of the one-time spike (page 8 of Actuarial Study 114).

The Report focuses on increases in the number of persons working with relatively low annual earnings and shows that the number has increased over time. SSI recipients who work under 1619 and earn quarters of coverage, and who eventually may become eligible for DI benefits, may to a certain extent contribute to increases in the number of individuals with low earnings on DI.

On page 4 of the Report, GAO states that after a 9-month trial work period, "benefit payments are terminated once SSA determines... earnings exceed the SGA level." In fact, benefits are ceased, followed by a grace period of 3 additional months of benefits paid. Following the grace period, the beneficiary enters an extended period of eligibility (EPE) under which benefits are reinstated if earnings fall below SGA. Termination does not occur until the end of the EPE.

Tables 3 and 4 (pages 13 and 15, respectively) raise the obvious issue of how benefits can continue for persons whose earnings exceed SGA level for an extended period. We suspect the numbers of cases in the table are relatively small and are probably anomalies: the blind, those with large IRWEs or subsidies and persons who continue to receive posted earnings that are not related to work (e.g., commissions). We believe that GAO should show the unweighted counts in each cell and ideally should have pulled folders to determine why no action was taken. Without further explanation of why benefits continue for 'workers with long-term earnings above SGA,' the tables cast doubt on the reports findings.

Appendix II: Comments From the Social Security Administration

3 Footnote 22 on page 11 should provide the series used for indexing the Consumer Price Index for prices, a wage index, etc. Page 16 refers to the "Master Beneficiary Earnings File," although we suspect the intended reference is to the Master Beneficiary Record or the Master Earnings File.

GAO's Mission

The General Accounting Office, the investigative arm of Congress, exists to support Congress in meeting its constitutional responsibilities and to help improve the performance and accountability of the federal government for the American people. GAO examines the use of public funds; evaluates federal programs and policies; and provides analyses, recommendations, and other assistance to help Congress make informed oversight, policy, and funding decisions. GAO's commitment to good government is reflected in its core values of accountability, integrity, and reliability.

Obtaining Copies of GAO Reports and Testimony

The fastest and easiest way to obtain copies of GAO documents is through the Internet. GAO's Web site (www.gao.gov) contains abstracts and full-text files of current reports and testimony and an expanding archive of older products. The Web site features a search engine to help you locate documents using key words and phrases. You can print these documents in their entirety, including charts and other graphics.

Each day, GAO issues a list of newly released reports, testimony, and correspondence. GAO posts this list, known as "Today's Reports," on its Web site daily. The list contains links to the full-text document files. To have GAO e-mail this list to you every afternoon, go to www.gao.gov and select "Subscribe to daily e-mail alert for newly released products" under the GAO Reports heading.

Order by Mail or Phone

The first copy of each printed report is free. Additional copies are \$2 each. A check or money order should be made out to the Superintendent of Documents. GAO also accepts VISA and Mastercard. Orders for 100 or more copies mailed to a single address are discounted 25 percent. Orders should be sent to:

U.S. General Accounting Office P.O. Box 37050 Washington, D.C. 20013

To order by Phone:

Voice:

(202) 512-6000

TDD: Fax:

(202) 512-2537 (202) 512-6061

Visit GAO's Document Distribution Center

GAO Building

Room 1100, 700 4th Street, NW (corner of 4th and G Streets, NW)

Washington, D.C. 20013

To Report Fraud, Waste, and Abuse in Federal Programs

Contact:

Web site: www.gao.gov/fraudnet/fraudnet.htm,

E-mail: fraudnet@gao.gov, or

1-800-424-5454 or (202) 512-7470 (automated answering system).

Public Affairs

Jeff Nelligan, Managing Director, NelliganJ@gao.gov (202) 512-4800 U.S. General Accounting Office, 441 G. Street NW, Room 7149, Washington, D.C. 20548

